
Subject: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Wed, 18 Jul 2012 18:44:05 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi All,

I just got the ASIO driver to pass 24 bit audio under Windows 7 64 using the 32 bit version of Reaper at a 200 sample buffer size! At 100 samples, I got some clicks and pops, but that was using a debug version of the driver. 100 or less may be possible on fast machines.

I've also been working on having the ASIO driver support external clock sources. I've made the required changes, but Reaper doesn't support a needed callback for us to use an external clock at 44.1k. That's no criticism of the folks at Cockos. It's a callback that no other hardware uses.

I'm going to turn my attention to recording 24 bit audio, and then get started on the control panel.

Things are going very, very well!

As for getting the PARIS application working under Windows 7 64, I've been reading a huge book on Intel Assembler so that I can decompile and fix the Ensoniq effects code. It crashes when it tries to open the VST plugin directory. There must have been some change in the API that it uses to scan for files. This happens even if no VST directory is specified in the paris.cfg.

I hope this update gives a lift to those who are patiently waiting for me to get this done.

All the best!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Will The Weirdo](#) on Wed, 18 Jul 2012 19:13:11 GMT

[View Forum Message](#) <> [Reply to Message](#)

As always Mike, your work is always appreciated.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Wed, 18 Jul 2012 19:27:36 GMT

[View Forum Message](#) <> [Reply to Message](#)

Thanks, Will!

I just got 24 bit recording working. This is too cool!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Wayne](#) on Thu, 19 Jul 2012 17:30:11 GMT

[View Forum Message](#) <> [Reply to Message](#)

Scherzo64 . . . what a cool name!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [thesandbox1](#) on Fri, 20 Jul 2012 23:39:14 GMT

[View Forum Message](#) <> [Reply to Message](#)

so will this work on windows 8?

HA!....totally kidding and can't wait to give this a go!

Thanks again Mike!!!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [casshern](#) on Sat, 21 Jul 2012 19:52:31 GMT

[View Forum Message](#) <> [Reply to Message](#)

We might be able to assume it COULD. But it's windows. You can't assume anything.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Tue, 24 Jul 2012 00:31:26 GMT

[View Forum Message](#) <> [Reply to Message](#)

It should run under Windows 8, but I have a feeling that Windows 8 is about to be the new VISTA. No one will care about it. I could be talked into installing it if there is an issue with the driver, but otherwise, I'll be skipping it.

I just tested to see how low I could get the buffers for playback with the new ASIO driver in 24 bit mode, and the best I can get is 150 samples. Not bad on an aging Phenom x6!

I'm just about to start on the control panel. I know that a lot of people are looking to use this with Reaper. I'm trying to find a way to work around the fact that Reaper closes the driver when one opens the properties dialog. I'll post more as I get to new milestones.

Cheers!

Mike

File Attachments

1) [reaper-with-new-asio.jpg](#), downloaded 2368 times



Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!
Posted by [kerryg](#) on Tue, 24 Jul 2012 01:07:14 GMT

[View Forum Message](#) <> [Reply to Message](#)

Insanely cool!!! Mike, have you contacted Justin about that driver closure issue yet? He's highly accomodating - maybe he'll have a idea about how Reaper could be more helpful.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!
Posted by [mikeaudet](#) on Tue, 24 Jul 2012 13:58:36 GMT
[View Forum Message](#) <> [Reply to Message](#)

Hi Kerry,

I have been emailing with Justin. He is an extremely cool guy! I think we're going to make the driver and Reaper work very well together.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!
Posted by [ganttmann1](#) on Wed, 01 Aug 2012 03:04:17 GMT
[View Forum Message](#) <> [Reply to Message](#)

Please forgive my ignorance - Is this a driver that will allow the Paris hardware to run w/ Reaper?
And THANKS Mike for keeping working on this stuff!

Gantt

mikeaudet wrote on Tue, 24 July 2012 09:58Hi Kerry,

I have been emailing with Justin. He is an extremely cool guy! I think we're going to make the driver and Reaper work very well together.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!
Posted by [mikeaudet](#) on Wed, 01 Aug 2012 12:32:48 GMT
[View Forum Message](#) <> [Reply to Message](#)

Hi Gantt,

No need to apologize. I'm working on the ASIO driver, which will work with Reaper, and should work with any ASIO host. I'm using it with the 64 bit scherzo driver.

Justin (Reaper developer) just made a change to Reraper that allows the PARIS ASIO driver to work with an external clock. It's very cool!

I'm just working out how to get the control panel working. I was going to use a library called QT, but it isn't playing nice with the rest of the driver code. I've started building it just using the Windows API.

One compromise that I'm leaning towards is having the hardware initialize when the driver is first accessed, not when it is officially started by the ASIO host application. The reason I'm thinking of doing this is that if the driver is reset by the host app, one doesn't have to wait for all the MEC modules to be re-initialized. The down side is that if one were to load up an ASIO host with the intention of using another audio interface, the PARIS hardware would still be initialized if the ASIO driver is installed.

What do you guys think of this?

All the best,

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [inky](#) on Thu, 02 Aug 2012 02:12:36 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Mike,

Paris and Reaper...a match made in...wait...does the Reaper have an exclusive with Heaven?

Looking forward to see how this all works!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [dnafe](#) on Thu, 02 Aug 2012 10:39:54 GMT

[View Forum Message](#) <> [Reply to Message](#)

mikeaudet wrote on Wed, 01 August 2012 08:32

One compromise that I'm leaning towards is having the hardware initialize when the driver is first accessed, not when it is officially started by the ASIO host application. The reason I'm thinking of doing this is that if the driver is reset by the host app, one doesn't have to wait for all the MEC modules to be re-initialized. The down side is that if one were to load up an ASIO host with the intention of using another audio interface, the PARIS hardware would still be initialized if the ASIO driver is installed.

What do you guys think of this?

All the best,

Mike

What would the impact be on Paris?

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Thu, 02 Aug 2012 14:38:52 GMT

[View Forum Message](#) <> [Reply to Message](#)

There would be on impact on the PARIS application. I need to fix the effects subsystem before we can run that in 64 bit Windows. It may make running Reaper and PARIS.exe a problem. Does that matter to anyone?

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [dnafe](#) on Thu, 02 Aug 2012 17:22:26 GMT

[View Forum Message](#) <> [Reply to Message](#)

not for me...it's usually one or the other

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [paris1958](#) on Fri, 03 Aug 2012 07:26:37 GMT

[View Forum Message](#) <> [Reply to Message](#)

Mike, YOU ROCK!

For me, I'd just like to be able to use PARIS again. I have 16 audio inputs dying to be used again.

On my secondary drive where I installed Win 7 32bit, I still haven't been able to get the current version of the scherzo driver to initialize my PARIS hardware.

I've been using SONAR X1 for quite a while. I like the fact I'm able to use VST instruments. A feature like that in PARIS would have been absolutely incredible. With the new PARIS ASIO driver would I be able to use my PARIS hardware with SONAR?

By the way, what will you be charging for the new 64bit drivers?

Cheers, JON

P.S. I hope everything turned out fine with your wife.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Fri, 03 Aug 2012 14:53:45 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Jon,

As far as I know, you'd be able to use the ASIO driver with Sonar or any other ASIO host. I'm just testing with Reaper.

I should clarify - any other 32 bit ASIO host. We need to convert the PSCL to 64 bits before I can get a 64 bit ASIO driver. I keep going back and forth on the best way to do that.

The 64 bit scherzo I have written allows for 32 bit software to connect to the driver under 64 bit windows. I should also allow 64 bit connections, but I don't have any to try it with.

I'm not sure what to charge. I'm going to have to buy a certificate to allow the 64 bit scherzo to load under Windows 7. I've got to figure all that out.

As for VST instruments, I've got that on my mind for the rebuild of the PARIS effects subsystem. That's the next stop after I get the ASIO done.

All the best!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [thesandbox1](#) on Fri, 03 Aug 2012 15:16:51 GMT

[View Forum Message](#) <> [Reply to Message](#)

Not to get ahead of the game but did I just hear VSTi's in PARIS for the first time?????

Mike....you are above and beyond!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Fri, 03 Aug 2012 15:35:24 GMT

[View Forum Message](#) <> [Reply to Message](#)

Well, this could take some time, but yes, I'd like to see that. I have to decompile the ensoniq written effects subsystem to assembly language and figure out how it works. Once I've got that done, I'll be in a position to write a new one in c++, and that's where things can get interesting.

Now, this is going to take some time. It's a big, big, ambitious project. Some might call it crazy. But, I really love PARIS, and I want to see it happen. I've already read a huge book on assembly language and tested some decompilers. It's started.

I always think long term with things.

Here are the steps - and they will take years. I guess step zero was the 64 bit scherzo.

- 1) ASIO driver - figure out how the voice engine works (done) and how we assign MEC modules (about to be done)
- 2) Fix the effects code - figure out how to build a VST host and how to assign effects to the EDS cards.
- 3) At this point, I'll know all I need to to write some kind of 64 bit PARIS software, be it all new code or written an an extension to an existing app.

That's what I'm thinking right now. But, I may change direction at some point. I'd also like to write a MIDI sequencer plugin for PARIS that would load in an effects slot and would be timed to the sample position. I may do that, or I may just get a new app going. There are so many possibilities. There's also always the faint hope that I'll get access to the PARIS source.

All the best!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [imajon](#) on Sat, 04 Aug 2012 19:49:34 GMT

[View Forum Message](#) <> [Reply to Message](#)

Amazing! Go MIKE Go!

My new Win 7 system is waiting and ready!

Next step will be to move the hardware side of things to Sharc dsp processors on new pcie cards or rack mount interface with PC Host card. I hope ID hires you and puts you in charge of the Project. Scary what Paris could do with more modern DA Converters along with the Mix Bus Algorithms using 64 bit word length like the Sac Audio Console ala Bob Lentini (Hand Compiled in Assembler) I had talked with him once and was talking about inerfacing Paris Hardware with it via ASIO. I described to him the ability of Paris to not clip when pushed and the 52 bit mix buss saturation thing going on. He explained to me the 64 bit word length of his system and the much added headroom with that. Though not exactly the same as what Paris does but combined application would be amazing.

Can't wait for the ASIO Driver that sees all the I/O of Paris Configuration

That is huge!

ESP2 Processor PDF File for geeks out there!

<http://watchmykidspc.com/ESP2.pdf>

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [cesmag](#) on Mon, 06 Aug 2012 08:02:42 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi, a question and excuse me if it is off topic . Will it ever be possible to use the c16 (at least some basic functions: faders, mute and solo, master volume, play, record, etc) with Reaper after the driver is ready and finished?

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Mon, 06 Aug 2012 17:42:18 GMT

[View Forum Message](#) <> [Reply to Message](#)

I think that is a fantastic idea! I'm not sure what ability reaper has to access a MIDI controller, but I'm going to see if I can send the C16 commands to a MIDI driver.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [dnafe](#) on Mon, 06 Aug 2012 21:05:56 GMT

[View Forum Message](#) <> [Reply to Message](#)

Apparently Doug Wellington (I think) has a box designed and built for this.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Mon, 06 Aug 2012 21:11:33 GMT

[View Forum Message](#) <> [Reply to Message](#)

The nice thing about doing this in the ASIO driver is that the PSCL is already loaded. I just have to do some digging to find out exactly how the PARIS app gets notified of the changes and hook in the same way. I think adding this is a great idea.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [cesmag](#) on Tue, 07 Aug 2012 06:56:12 GMT

[View Forum Message](#) <> [Reply to Message](#)

Wow, supercool!! Looks like Paris is ready for a new life ! Reborn !

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Fri, 10 Aug 2012 21:16:23 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi all,

just a progress report: I've got the control panel querying windows for the list of MID interfaces and putting them in a combo box for selection, and the driver itself both opens a midi out port and registers with the PSCL for C16 fader callbacks.

I'll write as soon as I have passed some c16 fader data back via a MIDI port.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Thu, 16 Aug 2012 19:05:39 GMT

[View Forum Message](#) <> [Reply to Message](#)

I just sent a midi command to Reaper from the c16...very cool!

UPDATE: I'm now controlling the transport, the faders, and the mutes from my c16!!!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [kerryg](#) on Thu, 16 Aug 2012 20:30:50 GMT

[View Forum Message](#) <> [Reply to Message](#)

Insanely cool! Wooot!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [cesmag](#) on Fri, 17 Aug 2012 11:08:29 GMT

[View Forum Message](#) <> [Reply to Message](#)

great Mike ! people...don't sell your hardware, Paper (Paris+Reaper) looks promising here

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [dnafe](#) on Fri, 17 Aug 2012 12:11:38 GMT

[View Forum Message](#) <> [Reply to Message](#)

Now that is very cool

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Fri, 17 Aug 2012 14:01:34 GMT

[View Forum Message](#) <> [Reply to Message](#)

It's working out really well. My next step is getting some code working to get midi messages from Reaper (I assume it sends the starting values when a project is loaded) and turn on the up or down arrows accordingly and turn them off when the fader hits the right spot.

I'm going to have to contact Justin about the jog wheel. I set it up to send pitch wheel messages, but Reaper doesn't seem to work well with them. The playback moves forward, but then moves back when the speed of the jog wheel returns to zero.

It was a very, very cool experience seeing the C16 control another app's transport, faders, and mutes for the very first time.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [kerryg](#) on Fri, 17 Aug 2012 17:19:01 GMT

[View Forum Message](#) <> [Reply to Message](#)

Awesome - is his being done through the Reaper extension SDK or is it all native inside the PARIS driver?

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Sat, 18 Aug 2012 13:32:07 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Kerry,

It's all being done inside the PARIS ASIO driver. There is a drop down box in the control panel, and the user can choose the MIDI port to use to send out MIDI messages that are derived from the C16 controls. I'd like it to work with any ASIO host, but I'll take a look at the SDK. That sounds interesting.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [anfallszonen](#) on Tue, 21 Aug 2012 19:19:16 GMT

[View Forum Message](#) <> [Reply to Message](#)

My god what are you made off....

Do you realize what you are about to do! PARIS is about to do a leap I never tought possible.
Thank you for doing this fantastic job! I will spread the word.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [thesandbox1](#) on Tue, 21 Aug 2012 19:52:40 GMT

[View Forum Message](#) <> [Reply to Message](#)

WOWZERS!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Mon, 27 Aug 2012 01:03:52 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi everyone,

I've been working of the C16 support. Reaper does not send feedback to a control surface without using a plugin. So, without a Reaper extension, there is no way to get the arrow lights to appear when the C16 is out of sync with the application.

So, I've been reading the Reaper API examples, and I'm going to write one that sends the needed feedback over a MIDI port. This way, the driver will work as envisioned on any other apps that send feedback, and Reaper will work, too.

Things are never as easy as I hope they will be, but we're making progress.

All the best,

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Philip](#) on Sun, 02 Sep 2012 00:14:32 GMT

[View Forum Message](#) <> [Reply to Message](#)

mikeaudet wrote on Sun, 26 August 2012 19:03Hi everyone,

I've been working of the C16 support. Reaper does not send feedback to a control surface without using a plugin. So, without a Reaper extension, there is no way to get the arrow lights to appear when the C16 is out of sync with the application.

So, I've been reading the Reaper API examples, and I'm going to write one that sends the needed feedback over a MIDI port. This way, the driver will work as envisioned on any other apps that send feedback, and Reaper will work, too.

Things are never as easy as I hope they will be, but we're making progress.

All the best,

Mike

This is insane. I am still lurking here. Using paris for my important projects and reaper when I am just tracking ideas for fun. So beyond Cool! Thanks for all your efforts Mike, and nice to see all the interest out there over this project. It seems like the interest in Paris is growing more now than I have seen since its hay day back in 1998-00.

Thanks to kerry too.

Rock!

-Phil

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mattcelt](#) on Fri, 07 Sep 2012 06:00:54 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hey Mike, had to chime in and add my thanks to the mix here. I cannot wait to send you a payment for a new driver.

I've been working with the Reaper actions a bit in the past couple of days, trying in vain to get my Griffin Powermate to work in Reaper the way the C16 jog wheel works in PARIS. So far, it's been a no-go. So your work with that is of real interest and relevance.

Forgive my ignorance, I hope I'm not stirring the pot unnecessarily here... but I was wondering, is MIDI really the best way to go for the C16's functionality? Would something like OSC (which Reaper already supports) or another protocol altogether be better? I don't have the technical know-how to reverse-engineer the RS-422 codes the board uses, so I don't know what the hardware supports, but I guess I'm worried about latency and that the density of codes one would need to process for a large-scale PARIS rig might overwhelm a MIDI channel. (Of course, I'm taking it as a given that the new ASIO driver would support multiple EDS/MEC/C16s...)

Also, completely off-topic... one of the main reasons I have never been able to get comfortable with another DAW is their user interfaces all look so damn flat. One of PARIS' best features (IMHO) is the very, very 3D look and feel of the system. Has anyone ever made a PARIS-lookalike theme for themselves in Reaper?

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Fri, 07 Sep 2012 11:21:22 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Matt,

You raise some good questions. The C16 uses a MIDI like protocol that has 10 bit values instead of 7 bit, as in the case of MIDI.

There is no danger of several C16s overwhelming a MIDI channel. It only sends data when a fader is moved or a button is pressed. The way I've set it up, each C16 sends the data over it's own midi channel. The first C16 sends data on channel 1, the second on channel 2, etc.

There might have been an argument to use the Reaper API instead of MIDI, but Reaper's API controls send and receive fader data as 7 bit values, just like MIDI. So, my thinking is that it's better to make something that will work with any audio app that supports MIDI control, since there's no advantage in Reaper to doing it using the API.

As for latency, I haven't noticed any at all. Keep in mind, it's MIDI, but it's all using internal "virtual" MIDI ports. There's no actual data going into and out of the computer.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [carlamburn](#) on Fri, 07 Sep 2012 21:03:21 GMT

[View Forum Message](#) <> [Reply to Message](#)

I am still checking this site off and on. Mike, I still use your multi-comp plugin all the time.

rock on,
- Carl

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mattcelt](#) on Fri, 07 Sep 2012 21:58:15 GMT

[View Forum Message](#) <> [Reply to Message](#)

Great to know, Mike. I wasn't sure if the C16 was polled actively or what. It's good to know it's silent most of the time. And I realize now that I was thinking about it the wrong way... somehow I was imagining Reaper talking directly to the C16, instead of having the ASIO driver handle that and convert it to a format that Reaper can use. That makes much more sense.

What sort of information and/or fine-grain resolution are we losing by translating 10 bits to 7? If I'm not mistaken (and I very well could be), OSC uses a 32-bit message size, which is more than enough to handle the 10 bits the C16 needs... if I'm not misunderstanding what OSC does. I don't

know how Reaper has implemented OSC, and whether PureData or some other shim would be required to make it work, but it seems to my untrained eye that OSC would give much more flexibility and future-proofing than using MIDI.

But of course, you're the one doing all the work. I'm just armchair qb'ing it over here.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Jim Drago\[2\]](#) on Sat, 08 Sep 2012 06:17:02 GMT

[View Forum Message](#) <> [Reply to Message](#)

Sorry if this is an ignorant question, but hey. So could a C-16 be used to say control the mixer in Record.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [lobit](#) on Tue, 11 Dec 2012 19:48:52 GMT

[View Forum Message](#) <> [Reply to Message](#)

I would be curious to know if paris retains some of its magical summing properties while running on another d.a.w. ?

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Dimitrios](#) on Sun, 20 Jan 2013 15:47:52 GMT

[View Forum Message](#) <> [Reply to Message](#)

Dear Mike !

Still hangin on with Paris waiting to BUY your new driver !!

Thanks for keep working on with it !

Regards,

Dimitrios

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Thu, 24 Jan 2013 15:29:49 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi All,

I just spent the last hour working on the driver. I've been away from it for the last six weeks, which really sucks. But, it's good to be back.

I ran into difficulty as a result of Reaper closing and reopening ASIO drivers when the control panel is opened. As you know, the PARIS hardware can take a while to open when it has to initialize MEC modules. I have 6 in my MEC, and the delay introduced when opening the control panel in Reaper was ridiculous.

So, I made changes to open the hardware when the ASIO driver is loaded instead of when the driver is activated by the app.

I started having weird, random crashes when the control panel opened.

I had to make a choice - fix it quickly or fix it right. I chose the latter. I've written the driver so that all hardware access is separated from the ASIO part. The advantage of this is that it is easier to debug because it's organized properly. It also gave me more insight into how the hardware is started up by the ASIO app. It's one thing to read code, it's a whole other level of understanding to write it. I didn't just copy and past it - I re-wrote it all to be efficient and maintainable.

I just got the new design to compile for the first time. I'm about to start debugging it.

Part of why I decided to write a new hardware object is that I'd like to get a new PARIS app written eventually. This could be a major extension of reaper, or something else. I'm not sure.

But, I haven't gone away or lost interest, and I feel absolutely terrible that this has taken so long. I definitely don't want to let anybody down. I'm in this for the long hall - I'll be using PARIS until my hearing finally goes completely, probably in my 80s (I hope it takes that long!). My wife has had chronic headaches since the summer, so I've been looking after my daughter more than I would have had Erin been healthy. We're doing all we can, and at least all the serious stuff has been ruled out (no tumour or aneurism), but it's still a challenge getting free time. I'm doing my very best and plan to do better.

I hope everyone is well. Back to work on PARIS for me...

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [thesandbox1](#) on Thu, 24 Jan 2013 16:36:10 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hey Mike....thanks for the update. Sorry to hear about your wifes headaches. Are they migraine type? If so I have over the years had a few episodes that last for weeks and the last time I ended up doing quite a bit of reading and found that COQ10, B12, and magnesium citrate taken with calcuim to absorb seemed to help quite a bit.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [ganttmann1](#) on Thu, 24 Jan 2013 18:15:57 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hey Mike!

It amazes me to know that anyone is still writing ANY software for Paris! Thank you! I'm not clear on what you're trying to accomplish, though. Are you trying to make the Paris interfaces work w/ Reaper? What do you mean by "Paris APP"? Something that lets a Paris GUI work in Reaper? Could Paris ever run with high sample-rate interfaces? It would be totally cool to run a Protools session using the Paris GUI, which I know inside and out. Pipe dreams, I know, but you never know...

Thanks for keeping trying! I'm still using Paris every day. Well, every day that I'm in the studio at least. I have a job offer from a PT 10 studio (maybe another, we'll see! two offers are always better than one!) so Paris may become a hobby soon. We'll see. Good news would hopefully be a guaranteed paycheck so the bank will let us keep the house, which could be a major issue soon.

Sorry to hear about your wife's health issues. My wife passed away at the end of November after almost 3 years of battling her cancer. That's been a hard one, but I'm finally beginning to get back to work and, hopefully, back on track to support my family.

Thanks!

Gantt

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [dnafe](#) on Fri, 25 Jan 2013 12:05:17 GMT

[View Forum Message](#) <> [Reply to Message](#)

My sincerest condolences Gantt.

Mike if your wife is suffering from cluster headaches let me know...I have a couple of decades of experience with these beasts and might be able to help.

As for your work with Paris, what can I say, freakin' awesome.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [inkyucy](#) on Fri, 25 Jan 2013 12:17:59 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Mike,

Sounds like great work on the new driver! Sorry your wife is not feeling well....I'm sure time spent with family is well deserved and very rewarding.

Keep up the good work!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [ganttmann1](#) on Fri, 25 Jan 2013 14:00:18 GMT

[View Forum Message](#) <> [Reply to Message](#)

Oops. Sorry Mike - I looked back and saw that I already asked this question and you already answered it.

Thanks!

Gantt

ganttmann1 wrote on Thu, 24 January 2013 13:15Hey Mike!

It amazes me to know that anyone is still writing ANY software for Paris! Thank you! I'm not clear on what you're trying to accomplish, though. Are you trying to make the Paris interfaces work w/ Reaper? What do you mean by "Paris APP"? Something that lets a Paris GUI work in Reaper? Could Paris ever run with high sample-rate interfaces? It would be totally cool to run a ProTools session using the Paris GUI, which I know inside and out. Pipe dreams, I know, but you never know...

Thanks for keeping trying! I'm still using Paris every day. Well, every day that I'm in the studio at least. I have a job offer from a PT 10 studio (maybe another, we'll see! two offers are always better than one!) so Paris may become a hobby soon. We'll see. Good news would hopefully be a guaranteed paycheck so the bank will let us keep the house, which could be a major issue soon. Sorry to hear about your wife's health issues. My wife passed away at the end of November after almost 3 years of battling her cancer. That's been a hard one, but I'm finally beginning to get back to work and, hopefully, back on track to support my family.

Thanks!

Gantt

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Wayne](#) on Fri, 25 Jan 2013 19:18:44 GMT

[View Forum Message](#) <> [Reply to Message](#)

Mike,

Like many of us, I'm in PARIS for the long haul. Have been since '97. I'll be here as long as you are here. Take the time. Do it right, to the best of your abilities and time constraints.

Mike and Gnant,
Best wishes to you and your family.

Lastly,
Avid (ProTools) called me this week to promote their PT10 HD and upcoming PT11 HDX. I

mentioned that my PTMP9 (with M-Audio Fast Track) doesn't come close to the beauty of the PARIS sound. He said, "Paris, France?". Well, that started a new thread. He said, "sounds like PARIS was on the cutting edge ... ". And then I mentioned the low latency, and EDS onboard DSPs with no hit to the CPU. We went "wow!, send me info".

Long story short, I sent him links to Kerry's different sites, FAQs, BT's articles, the PARIS ref manual, Intelligent Devices, EMU, etc.

Maybe they'll learn something, maybe they won't.

Wayne

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [ganttmann1](#) on Fri, 25 Jan 2013 19:49:36 GMT

[View Forum Message](#) <> [Reply to Message](#)

Someone told me that PT10 uses 52 bit floating point math (someone correct me if I'm wrong!). A big part of the Paris sound is the (someone correct me if I'm wrong again!) 56 bit floating point processing. Only ahead of their time by what? 18 years? Where are all those engineers who created the EDS card? Those guys knocked the ball outta the park! Then St. Croix and Edmund created a software processor and GUI that is still, for me at least, the fastest, most efficient editor ever.

I'm gonna miss Paris when it's gone...

Gantt

Wayne wrote on Fri, 25 January 2013 14:18Mike,

Avid (ProTools) called me this week to promote their PT10 HD and upcoming PT11 HDX. I mentioned that my PTMP9 (with M-Audio Fast Track) doesn't come close to the beauty of the PARIS sound. He said, "Paris, France?". Well, that started a new thread. He said, "sounds like PARIS was on the cutting edge ... ". And then I mentioned the low latency, and EDS onboard DSPs with no hit to the CPU. We went "wow!, send me info".

Long story short, I sent him links to Kerry's different sites, FAQs, BT's articles, the PARIS ref manual, Intelligent Devices, EMU, etc.

Maybe they'll learn something, maybe they won't.

Wayne

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Ted Gerber](#) on Sun, 03 Feb 2013 13:39:07 GMT

[View Forum Message](#) <> [Reply to Message](#)

Gantt

I'm very sorry to hear of your wife's passing.

Please keep making great music.

Best

Ted

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [ganttmann1](#) on Sun, 03 Feb 2013 13:54:10 GMT

[View Forum Message](#) <> [Reply to Message](#)

Thanks, Ted. I'll try.

Gantt

Ted Gerber wrote on Sun, 03 February 2013 08:39Gantt

I'm very sorry to hear of your wife's passing.

Please keep making great music.

Best

Ted

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Thu, 07 Feb 2013 22:06:50 GMT

[View Forum Message](#) <> [Reply to Message](#)

Gantt, I am so sorry to hear about your wife passing. If there is anything I can do for you or your family, just let me know.

I know you posted your message quite some time ago, so I'm very sorry I haven't read it until today. I find when things are not progressing with the PARIS code, I hide from the forum because I feel guilty.

But, I finally, finally fixed the crashing control panel problem today, so with a little luck the wind will be in my sails again and this thing will finally get done.

To think I thought this would be a quick project to make the 64 bit driver useful before I started

re-writing the effects subsystem code. I can see why companies hesitate to update drivers for older hardware. Thankfully, I'm not a company.

Take care,

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Thu, 14 Feb 2013 03:59:17 GMT

[View Forum Message](#) <> [Reply to Message](#)

PARIS Loads under Windows 7 64! It does not play back audio properly, which means I have a bug in my double buffering code, but I can work on that. I know that the driver can pass audio because the ASIO works. The ASIO doesn't need a double buffering workaround, so that's the only place that the problem can be.

On one playback attempt, I could clearly hear acoustic guitar playing back, but there was static every so often. The next try, it was silence. But, I can work on that!

I loaded up my heartbeat plugin, and I hear the PARIS heartbeat for the first time under Windows 7 64. I have no idea how I'm going to sleep tonight.

If anyone ever gets the following error:

```
*** ASSERTION FAILED: NativeFxLibrary.cpp:191 ((LibraryHeader*)libData)->tag==kLibTag
```

It may be that ParisGlobalFxLibrary.fxl is corrupted. Delete it, and PARIS creates a new copy when it launches. That took a while to sort out.

The other issue I was having was an access violation when PARIS started, and that was cleared up two days ago when I tried compiling the PSCL with Visual C++ 2010 and it worked.

Holly crap!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [paris1958](#) on Thu, 14 Feb 2013 06:10:43 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hello Mike,

Hope all is well with you and your family!

I certainly do appreciate all the time and work you have put in to help keep PARIS alive after it's untimely death by E-MU and Intelligent Devices.

Your latest news regarding PARIS ASIO & Scherzo64 is just great!

Are you saying it's almost ready for "Primetime"? If so, any thoughts on when we'll be able to get our hands on it? No pressure....just wonderful anticipation!

Once you've finished with the PARIS ASIO & Scherzo64 [wheeeewwwwww], and have some free time, I'd like to chat with you about my help in creating any new U.I. graphics and what we feel needs a redesign or update.

Cheers!

JON

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Ted Gerber](#) on Fri, 15 Feb 2013 12:44:22 GMT

[View Forum Message](#) <> [Reply to Message](#)

Very good news. Keep it up (if you don't mind me saying!)

Ted

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Fri, 15 Feb 2013 14:23:07 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Jon,

I think we might be almost ready for prime time. I have to resolve the double buffering bug - but at least that's my code - and I have to do a bunch of stress testing. But, when I load PARIS, I can load EDS plugins, look at all the MEC cards in the patch bay, play audio (though garbled) - it looks really good!

As for graphics, I think there is going to be lots of opportunity for skinning the control panels in the ASIO control panel.

I do want to be up front that the ASIO driver will still be 32 bit for now. It will run under a 64 bit OS, but will only be accessible to 32 bit audio applications. I have to convert the PSCL to 64 bits

before we can get a true 64 bit ASIO. But, now that the ASIO is compiling under a modern compiler, that will be a lot easier to do (though still hard).

I'll keep you posted!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Thu, 21 Feb 2013 18:19:13 GMT

[View Forum Message](#) <> [Reply to Message](#)

This is one of the best days ever.

The PARIS application is running on Windows 7 64.

So far, I've tested one VST plugin, and it worked. I haven't tried UAD plugins or the FXspantion wrapper.

I can play back 32 tracks before I get a "disk too slow" warning. I have 4 cards, so this is not ideal, but I checked in Windows XP, and that is the exact same number I can get there, too. So, it's just that the software RAID that came with my motherboard sucks.

All 4 of my cards pass audio just fine.

EDS effects work.

Automation works.

CS16 works.

Recording audio works.

I can't find anything yet that doesn't work.

I'll do more testing over the next few days, and I have a bit of code cleanup to do. There is some memory leaking from somewhere, and I have a bunch of debug messages to remove.

After 4 years (has it been that long?), it works!!!!

Give me a couple more weeks to test and tweak, and this should be out and ready to use.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [kerryg](#) on Thu, 21 Feb 2013 18:22:01 GMT

[View Forum Message](#) <> [Reply to Message](#)

WoooooHOOOOO - PARIS passes a huge milestone! Major celebration time!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Dimitrios](#) on Thu, 21 Feb 2013 21:21:05 GMT

[View Forum Message](#) <> [Reply to Message](#)

Thats fantastic news !!!!!

How much would you ask for your release ?

I need to raise the money !

Thanks for the time you spent my friend and I am sure that now NEW Paris users will join us and thus paris stuff will get more expensive and sought after ! but anyway that is also good news I guess !

Take care,

Dimitrios

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Dimitrios](#) on Thu, 21 Feb 2013 21:23:03 GMT

[View Forum Message](#) <> [Reply to Message](#)

By the way Mike !

I still use XP !!

So I just need it to work as ASIO for Cubase under XP and see all cards in mecs with low latency...

Are we already there or same testings apply for windows 7 64 bit ?

Thanks again !!!

Dimitrios

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [kerryg](#) on Thu, 21 Feb 2013 23:01:52 GMT

[View Forum Message](#) <> [Reply to Message](#)

The last I tried them, the beta ASIO drivers worked down to 256 samples latency and saw all the i/o of my 2 MEC/multiple MEC module rig. Don't know if anything's changed since then.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [danielcornelius](#) on Fri, 22 Feb 2013 10:08:03 GMT

[View Forum Message](#) <> [Reply to Message](#)

Thats good to hear .

If you sell the new driver, let me know i take one for your hard work.

I wonder myself is still somone there ro rework Paris 3.0. Someone like to make a progamming projekt to improve Midi.

In my mind i got the imagination to implement something like Cubase, Reaper into Paris to Handle Midi easy by paris.

Let me know if someone likes to do this. We can build a workgroup, i need some practice in programming.

Did someone know if orginal code can changed ? Else if it opensource now, after the long time ?

Best Regards
Dan

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Fri, 22 Feb 2013 13:20:02 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Dimitrios and Dan,

Finishing the ASIO driver is my next priority. It has a control panel for selecting MEC modules and allows the use of all cards. I had the latency down to 70 samples, if I remember right. It also allows the C16 to be used as a MIDI controller.

I think I've got the 64 bit driver just in time. XP is not getting any more security updates after April 2014. And, almost all new PCs ship with a 64 bit OS. A 64 bit driver makes things a lot easier going forward.

As for the PARIS software, ID hasn't released the source code, so I can't really do much with the PARIS app itself. But, the VST subsystem is in a dll, so it may be small enough that I can reverse engineer it. The MIDI subsystem is in a dll, too. I'd like to take a crack at getting rid of the MIDI engine errors.

All the best!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [lobit](#) on Fri, 22 Feb 2013 20:02:07 GMT

[View Forum Message](#) <> [Reply to Message](#)

where could one obtain these 'beta' asio drivers in the meantime?

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [inkycu](#) on Mon, 25 Feb 2013 19:29:28 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Mike,

That's great news about the Win7 driver and new asio! (yeah!)

I'm also glad that you are working towards incorporating Paris with Reaper. Right now I have Reaper synced with Paris using MTC following Paris during play. However, when paris is stopped, editing in Reaper takes some coordination since the current control 16 is not compatible with Reaper.

Just like to say your approach with Reaper and control 16 is very innovative and I'm hoping for the best!

Thanks, Inkycu

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Fri, 01 Mar 2013 14:29:09 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Lobit,

The beta ASIO driver that Kerry alluded to passed 16 bit audio only and crashed if it was closed and then reopened. There was no control panel and no c16 MIDI support. It was a very, very early build.

I'll get the new driver done as soon as I can. We had bad weather this week, so my mom wasn't able to come up and look after my daughter. That meant I got no PARIS time this week.

But, I'll be on this as soon as I can.

All the best,

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Sat, 02 Mar 2013 20:31:53 GMT

[View Forum Message](#) <> [Reply to Message](#)

I just recorded 8 tracks simultaneously under Windows 7 64 without PARIS breaking a sweat.

File Attachments

1) [paris-recording.jpg](#), downloaded 1089 times

Mixer/1-SubMix 1 (A) : [Untitled Project]

Edit Functions Settings EQ Aux Tracks Automation

	1	2	3	4	5	6	7	8	9
1	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS
2	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS	<input type="checkbox"/> BYPASS
3	AUX 1 OFF	AUX 1 OFF	AUX 1 OFF	AUX 1 OFF	AUX 1 OFF	AUX 1 OFF	AUX 1 OFF	AUX 1 OFF	AUX 1 OFF
4	No Effect	No Effect	No Effect	No Effect	No Effect	No Effect	No Effect	No Effect	No Effect
5	POST PAN	POST PAN	POST PAN	POST PAN	POST PAN	POST PAN	POST PAN	POST PAN	POST PAN
6	0	0	0	0	0	0	0	0	0
7	EQ ON	EQ ON	EQ ON	EQ ON	EQ ON	EQ ON	EQ ON	EQ ON	EQ ON
8	OPEN	OPEN	OPEN	OPEN	OPEN	OPEN	OPEN	OPEN	OPEN
9	NO GROUP	NO GROUP	NO GROUP	NO GROUP	NO GROUP	NO GROUP	NO GROUP	NO GROUP	NO GROUP
10	FAD -OUT-	FAD -OUT-	FAD -OUT-	FAD -OUT-	FAD -OUT-	FAD -OUT-	FAD -OUT-	FAD -OUT-	FAD -OUT-
11	PAN -OUT-	PAN -OUT-	PAN -OUT-	PAN -OUT-	PAN -OUT-	PAN -OUT-	PAN -OUT-	PAN -OUT-	PAN -OUT-
12	E.Q. -OUT-	E.Q. -OUT-	E.Q. -OUT-	E.Q. -OUT-	E.Q. -OUT-	E.Q. -OUT-	E.Q. -OUT-	E.Q. -OUT-	E.Q. -OUT-
13	AUX -OUT-	AUX -OUT-	AUX -OUT-	AUX -OUT-	AUX -OUT-	AUX -OUT-	AUX -OUT-	AUX -OUT-	AUX -OUT-
14	L 100	R 100	L 100	R 100	L 100	R 100	L 100	R 100	L 100
15	SOLO MUTE	SOLO MUTE	SOLO MUTE	SOLO MUTE	SOLO MUTE	SOLO MUTE	SOLO MUTE	SOLO MUTE	SOLO MUTE
16	1	2	3	4	5	6	7	8	9
	10	10	10	10	10	10	10	10	10
	15	15	15	15	15	15	15	15	15
	20	20	20	20	20	20	20	20	20
	25	25	25	25	25	25	25	25	25
	30	30	30	30	30	30	30	30	30
	35	35	35	35	35	35	35	35	35
	40	40	40	40	40	40	40	40	40
	50	50	50	50	50	50	50	50	50
	70	70	70	70	70	70	70	70	70
	1.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	-4.4
	1	2	3	4	5	6	7	8	9
	REC	REC	REC	REC	REC	REC	REC	REC	REC
	AUTO	AUTO	AUTO	AUTO	AUTO	AUTO	AUTO	AUTO	AUTO

00:00:14.822

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [kerryg](#) on Sat, 02 Mar 2013 20:33:09 GMT

[View Forum Message](#) <> [Reply to Message](#)

Oh man, this is amazing!!!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [paris1958](#) on Sat, 02 Mar 2013 23:08:28 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Mike,

Okay...now that you've totally teased us with the image of the successfully recorded 8 tracks with PARIS in Win7 x64, how much longer are you going to put is though our "chomping at the bit"?

That's great to know you're getting that much closer to the release of the drivers. Any guess as to when that might be? What will the price be for the drivers?

Off topic....

In case you haven't heard of Leap Motion, check out www.leapmotion.com. It's a company who's about to release a very cool new 3D [hand & finger] gesture interface for computers. The leap device is 4" x 1.25" x .5" high. It connects via USB. It works like the hand gesture device in the movie Minority Report with Tom Cruise. I signed up to be a developer to create apps for the leap device. I'm going to do stuff with midi and to control DAW's. Check it out.

Cheers,
JON

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Sun, 03 Mar 2013 02:10:49 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Jon,

The new controller looks very cool! I can't wait to see what you do with it.

I'm just looking into how to do the installer for the driver and PARIS 3.0. Microsoft has one, but it only comes with the \$800 version of VC++, and I don't have that version.

I just ordered a book on the Microsoft Installer (MSI files). It should be here Wednesday. I'm looking at other options, too. It looks like installers are a bigger PITA than I would like.

As a total aside, I think I may have just found a way to get Cakewalk Pro Audio 9 to have better MIDI timing and sync under Windows XP/VISTA/7. I was reading through my Windows via c++ for info on the Windows installer. I didn't find any, but I found some good hints on dll injection, and

that could mean I can tighten up the timer for the process in two or three lines of code...

All the best!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mattcelt](#) on Sun, 03 Mar 2013 06:13:50 GMT

[View Forum Message](#) <> [Reply to Message](#)

If the \$800 installer is the best way to get this done, let us know, Mike. We'll chip in and get it for you.

Thank you once again for all your amazing hard work. You are the soul of PARIS - I think you've been working on it longer than any of the original developers at this point.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Wed, 06 Mar 2013 13:16:24 GMT

[View Forum Message](#) <> [Reply to Message](#)

Thanks so much for the kind words, Matt,

The book was a bust. It should be called "everything you need to know about Windows Installer - except how to make one."

But, I found an affordable installer package that looks like it will do everything we need. I'll be starting to build it this afternoon.

All the best!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [carlamburn](#) on Wed, 06 Mar 2013 18:03:48 GMT

[View Forum Message](#) <> [Reply to Message](#)

This is cool. Way to be, Mr. Audet!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Thu, 07 Mar 2013 21:30:50 GMT

[View Forum Message](#) <> [Reply to Message](#)

Just an update:

The installer section of the installer is done and works, and I'm working on the uninstaller.

I just applied for a Microsoft Authenticode certificate so that the driver will be signed.

Things are going very well.

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [paris1958](#) on Fri, 08 Mar 2013 00:19:01 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hey Mike,

Thanks for the update! And of course, for your all time and effort.

Here's a big thumbs up!

JON

File Attachments

1) [thumbs-up.jpg](#), downloaded 889 times



Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Sat, 09 Mar 2013 19:47:01 GMT

[View Forum Message](#) <> [Reply to Message](#)

More good news:

I just got the PARIS virtual MIDI driver to run under Windows 7/64. It only works in 32 bit apps, but I've currently got Cakewalk 9 syncing to PARIS via MTC, and that is very cool.

The second cool thing is that PARIS 2.0 depends on the Paris MIDI driver (it won't start if the PARIS MIDI driver is not present), and now it runs under Windows 7 64, too!

I've added PARIS 2 and the MIDI driver to the installer.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [dnafe](#) on Sun, 10 Mar 2013 12:50:59 GMT

[View Forum Message](#) <> [Reply to Message](#)

Here's a huge thanks for your efforts Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Philip](#) on Wed, 13 Mar 2013 01:18:29 GMT

[View Forum Message](#) <> [Reply to Message](#)

MIKE! You did it! I am so excited for your efforts and the impending success.

Perfect timing too! My 6 year old system that have been using to run Paris with Win 7 32 just died, so it is time to replace and reload Paris.

Thanks for everything you have done on this project specifically and your helping to keep this GREAT DAW going this strong, this long after it was dumped by ID.

You are the man....

-Phil

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Dimitrios](#) on Wed, 13 Mar 2013 09:24:36 GMT

[View Forum Message](#) <> [Reply to Message](#)

I agree with all these great posts regarding Mike and his dedication to "Paris" !!

Really here to support him and his efforts, the best I can !!

Dimitrios

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Philip](#) on Fri, 22 Mar 2013 07:07:46 GMT

[View Forum Message](#) <> [Reply to Message](#)

Mike,

I have seen some of your other posts about your distaste with Windows 8. Any chance the new drivers will work under win8 64?

I have done dual boot before and it isn't an issue, but just wondering.

Thanks,

Phil

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Fri, 22 Mar 2013 15:45:32 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Phil,

It should work under Windows 8 64 just fine. I just won't be trying it.

For an update: I got together with a semi-local PARIS user yesterday, and we had some trouble getting the driver to work on his Core i7 based system. The way I'm exposing the hardware memory to the PSCL didn't work on his computer even though it works perfectly on mine. I've got another solution 99% done, and I'm hoping it clears up the issue on his PC. I hope to know by the end of the weekend.

The installer worked almost perfectly. The registry entries, path update, PARIS 2 and 3 installs, and the PSCL install all worked perfectly. The new control panel for the driver installed, but wouldn't open. The scherzo drivers didn't install for some reason, but we were able to get them going manually. I'll be looking into these things.

That's the latest. It's getting there.

All the best,

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Dimitrios](#) on Fri, 22 Mar 2013 16:22:47 GMT

[View Forum Message](#) <> [Reply to Message](#)

So glad about all these Mike !!

Just looking forward into it !

My respect to you for your phenomenal dedication and knowledge abilities and "Paris spirit" !!

Regards,

Dimitrios

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Philip](#) on Fri, 22 Mar 2013 18:54:06 GMT

[View Forum Message](#) <> [Reply to Message](#)

Thanks Mike. Very exciting. Let me me know if there is anything I can do to help beyond cheer leading and in the mean time, I will keep my Paypal account ready!

Thanks for all your effort and enthusiasm.

-Phil

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Fri, 22 Mar 2013 19:47:30 GMT

[View Forum Message](#) <> [Reply to Message](#)

Thanks, guys!

I just got the alternate way of sharing the memory working - just in time - Izzie is just about to wake up.

Here's hoping it works on the Intel machine.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Sat, 23 Mar 2013 01:26:49 GMT

[View Forum Message](#) <> [Reply to Message](#)

The memory fix worked! We are all systems go. I just have to fix one issue with the installer, and we're ready to launch.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!
Posted by [inkyku](#) on Sat, 23 Mar 2013 01:51:16 GMT
[View Forum Message](#) <> [Reply to Message](#)

wow!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!
Posted by [Dimitrios](#) on Sat, 23 Mar 2013 08:54:38 GMT
[View Forum Message](#) <> [Reply to Message](#)

Amazing !!!!!!!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!
Posted by [Ted Gerber](#) on Sat, 23 Mar 2013 20:11:51 GMT
[View Forum Message](#) <> [Reply to Message](#)

Hey Folks!!

I'm using this new version and I'm loving it!

Smooth, stable and quick.

I still need to sort out installing my most important VST plugs (not so good at this sort of thing), and I'm playing around with some internal and external bussing options, but this is really great.

Mike has done a fantastic job of this. Though I'm not a full time mix engineer, I've made my living with my ears for 30 years in the music business, and for me, Paris is the closest ITB solution to mixing on a real console. I'm hybrid'ing it with external inserts and want to add a summing box or modded small console at some point, but to get a "better" result using any other approach, a whole lot more money would need to be spent.

For those of you still using Paris, I highly recommend this update.

Best

Ted

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Sat, 23 Mar 2013 21:38:28 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Ted,

I've got to get you a release build of the PSCL - it will get even better.

The 64 bit driver isn't just the last release, but 64 bits. I've been making improvements all over it for the last several years.

Thanks for the kind words!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Tom Bruhl](#) on Mon, 25 Mar 2013 03:55:49 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hey Mike,

This is outstanding. I knew you could do it! I am ready to make the Win 7 jump as soon as you get the new drivers released.

Will Cubase chase to Paris internally as it does in my XP machine via MTC if they're both 64bit apps? If not what's the best work around? I'm thinking hardware would involve two midi boxes, one for each application.

Your dedication is over the top and deserves more than just money as a reward. You and your family are always welcome here in the Boston area just let me know.

Gratefully,
Tom

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Mon, 25 Mar 2013 12:07:11 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Tom,

Thanks for the kind words.

The PARIS PThru driver is included, but it is a 32 bit "user install" driver, which means that only 32 bit apps can talk to it. The PARIS app remains 32 bit, so it works with the PThru driver. I may be able to extend it so that a 64 bit app could use it, too. But for now, as long as both apps are 32 bit, you can sync via MTC as usual.

As a work around, I found an application called "loop MIDI" that allows dynamically adding MIDI ports in Windows 7 64. I think that would allow syncing between a 32 bit app and a 64 bit app. I've used it to sync Reaper to PARIS, but I was using the 32 bit version of Reaper.

<http://www.tobias-erichsen.de/software/loopmidi.html>

Cheers!

Mike

PS "User Install driver" doesn't mean that you'll have to do anything special to install it. It's just the name Microsoft gave to a class of user mode drivers that existed in Windows 3.1 and continue to be supported in Windows 7 64 and beyond. It's also still the best way to do a virtual MIDI driver because the stream doesn't have to go through the kernel, which would slow things down.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Tom Bruhl](#) on Mon, 25 Mar 2013 15:11:36 GMT

[View Forum Message](#) <> [Reply to Message](#)

Mike,

Thanks for the LoopMidi link. it looks exactly like what is needed. I'll give it a try as soon as I have all the essential components to my new DAW comp.

I am waiting for the new Paris ball to drop !

~Tom

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Sat, 06 Apr 2013 16:59:42 GMT

[View Forum Message](#) <> [Reply to Message](#)

I'm sorry about the delay getting this released. The new control panel for setting CPU affinity wasn't showing it's icon in Windows 7 64. It took me forever to get it sorted out, but it's done. The blank page default "missing icon" looked like crap, and I just couldn't let it go.

I think all I have left is to test the uninstaller.

All the best!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Sat, 06 Apr 2013 19:50:51 GMT

[View Forum Message](#) <> [Reply to Message](#)

I'm finally getting to really play with PARIS under Windows 7 64 now that everything appears to be done.

UAD plugins are working as before with the double wrapping. Be sure you don't install the optional mono UAD plugins. They have a nasty echo with the FXSpansion wrapper.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [portscan](#) on Tue, 09 Apr 2013 00:31:58 GMT

[View Forum Message](#) <> [Reply to Message](#)

hi

own win8 pro

know a bit of c++ (I use it for pro needs)

would LOVE to give some help (can debug under vs2010 on a win8 i5 16g of ram machine).

Especially if you want to rewrite the app...

About running paris under win7 64bits version, a few dumb questions to lucky owners/users. I'm not sure about the answers (i ask these before to do the jump, I'll need to purchase a vituavia if i do the upgrade, hence the questions) :

-does it support live mix ?

-can we finally use vst fx while in live mix directly applied on hardware inputs ?

-do the asio drivers show 8in / 8out / adat io in other apps ?

If I'm correct, to make it work on my machine, I'll have to install the regular paris 32 bits app and use the 64bits drivers ?

I'm actually trying to find a way to apply vst fx to hardware inputs, live, while keeping the paris system hardware and mixer.

don't know if we already can use vst on live inputs, my "paris pc" is way too old to even try.

Thanks !!!!

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [carlamburn](#) on Wed, 10 Apr 2013 21:38:53 GMT

[View Forum Message](#) <> [Reply to Message](#)

Heya Mr Audet, where will these drivers be available? How do I get them?

thanks,
- Carl

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Thu, 11 Apr 2013 00:59:50 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Portscan,

I'll keep you posted on a beta opportunity. I'm trying not to take on too much at once. I'd like to fix things in the current test group before expanding it. Thanks so much for the offer!

Update for everyone:

I've been testing the driver with some brave souls, and there have been a lot of success, but some issues, too.

There seems to be a bug in some CPUs that makes sharing the EDS100 hardware RAM with the PSCL in 64 bit mode tricky. If I do it one way, it works on most systems, but not on all of them. If I do it another way, I get the same problem. On most systems, both ways work. I just finished up a build that tries up to three different ways (two ways really, with a variation on one of them) to map the RAM. So far, at least one of the ways works on every system we've tried. But, it's been tougher than I expected and taken some time.

There may be a timing issues to overcome, too; one system is getting stuck at initializing the timing chip (ESP F). I'll be working on that as soon as I can. Four other systems are working fine, though.

So, the driver isn't available yet, but I'm working as hard as I can to get it ready for you guys!

All the best!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Thu, 11 Apr 2013 21:09:58 GMT

[View Forum Message](#) <> [Reply to Message](#)

Great news! The esp chip issue that a beta tester had was a bad EDS Card, not a problem with the driver. We're very close indeed.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Fri, 12 Apr 2013 11:10:47 GMT

[View Forum Message](#) <> [Reply to Message](#)

More great news! The latest tester installed PARIS and the driver from the installer without any issues!

Also, we've had a successful test of PARIS on Windows 8 x64.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Dcbite](#) on Sat, 13 Apr 2013 07:02:35 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hey Mike ,

Wonderful news . Things are really starting to heat up now !! For years I have been religiously checking the site for updates , awaiting the release of your hard work . Whatever you release I'm grateful and ready to hit the pay now button . Look forward to having Paris back up and accessible in Win 7 x64 and if I can use the C16 with Cubase , even better .

3 Cheers to Mike !!

P.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Dimitrios](#) on Sat, 13 Apr 2013 07:48:37 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Mike !!

So as to summarize if you please...

It is hard to gather so much info from all hat posts...

- 1) So you finally managed to have Paris with any number of cards (i have three) attached each to own mec with any kind of modules work under XP and windows 7 and windows 8 (dont care for that for now) wih ANY DAW that uses asio, right ?
- 2) Paris controller can work as a midi controller for that specific DAW ?
- 3) The "magic" of paris sound will be somehow lost due to "other" DAW routings but still Paris hardware and EDS effects are there !
- 4) YOU ARE WILLING to write a VST EDS EFFECT that will let us use a vst instr\ument from within Paris ??? Will that have the ususal time delay like other vsts ?
- 4) ARE YOU WILLING to write a new DAW specially made for Paris that will use the Paris "magic" ? If it will be a completely new what would be the difference with just using REAPER for instance ? Would it be that the drivers DO NOT need to be asio so NO DELAYS at all ??? If so I AM IN for that new DAW that will have delay compensation VST instrument support and way better editing audio !!
- 5) Would you consider selling alone the ASIO driver for someone not willing to jump to win7 ? That would help sell more drivers... I for sure will buy also the win7 driver although I would not use win7 !!!

THANKS FOR EVERYTHING !!!!!!!

Believe me your efforts are highly appreciated from everyone in here !!!

Chees my friend !

Dimitrios

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Sat, 13 Apr 2013 13:36:20 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi Dimitrios,

I'll answer the questions in order

- 1) So you finally managed to have Paris with any number of cards (i have three) attached each to one MEC with any kind of modules work under XP and windows 7 and windows 8 (dont care for that for now) wih ANY DAW that uses asio, right ?

The ASIO driver is separate from the 64 bit scherzo, but works with it. I still haven't finished this project, but, yes, all the interfaces on all cards will work with any ASIO host.

- 2) Paris controller can work as a midi controller for that specific DAW ?

Yes, the C16 sends MIDI data through a selectable MIDI port, and this can be picked up by any application that supports MIDI control.

- 3) The "magic" of paris sound will be somehow lost due to "other" DAW routings but still Paris hardware and EDS effects are there !

I think some of the PARIS magic is from the hardware, so that will still be there. I haven't managed to get EDS effects to work with the ASIO driver, but I'm going to look into it. This might have to be part of a follow up release because it would mean a big re-write.

4) YOU ARE WILLING to write a VST EDS EFFECT that will let us use a vst instrument from within Paris ??? Will that have the usual time delay like other vsts ?

The VST subsystem is another project that I haven't even started yet. I'll do my best!

4) ARE YOU WILLING to write a new DAW specially made for Paris that will use the Paris "magic" ? If it will be a completely new what would be the difference with just using REAPER for instance ? Would it be that the drivers DO NOT need to be asio so NO DELAYS at all ??? If so I AM IN for that new DAW that will have delay compensation VST instrument support and way better editing audio !!

I'm going back and forth on this one. I don't know if it's better to write a reaper plugin or start something from scratch. I'd really like to take PARIS from where it was in 2001 and extend it, though. I like the layout and the look. I don't have the same warm feeling towards Reaper, as great as it is.

5) Would you consider selling alone the ASIO driver for someone not willing to jump to win7 ? That would help sell more drivers... I for sure will buy also the win7 driver although I would not use win7 !!!

Absolutely! The ASIO driver will be a separate product.

Cheers!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [DJ](#) on Sun, 14 Apr 2013 17:13:35 GMT

[View Forum Message](#) <> [Reply to Message](#)

Mike,

Not trying to sidetrack this thread and admittedly I've been out of the loop here for quite a while so I would need to sit here and read all day to catch up on the current state of Paris and all of the work you have done.

Just wondering about something that might be, at least partially, relevant to this thread. Many years ago when SSC was still with us, a fellow Parisite who is a friend of mine and who knew SSC approached him about buying the Paris code. Nothing ever happened subsequently due to SSC's passing but one thing that stuck with me while I was in the loop briefly was that SSC's assertion was that the "sound" of Paris had everything to do with the software application.

Now I see you've got Cockos onboard using Reaper with the Paris hardware. Is the Paris DSP

available on auxes and inserts in Reaper? Just wondering if that wonderful Paris headroom is still evident in Reaper.

Another thought I have involves the new UAD Apollo. They are reporting 2ms latency even with stacked plugins while recording in real time. I'm going to do some checking to see if these plugins can be bussed to the Apollo ADAT ports. If so, if it and the MEC were synced to a common clock source, you would be able to apply UAD2 plugins within the Paris GUI in pretty much real time.

For my purposes, something like this, with simple latency compensation, would provide that "best of both worlds" thing we've all been looking for.

Peaceout.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [mikeaudet](#) on Sun, 14 Apr 2013 18:04:32 GMT

[View Forum Message](#) <> [Reply to Message](#)

Hi DJ,

It's great to see you around here. The work I've done with Reaper so far has just been using it as an ASIO host. I haven't yet got EDS plugins working with it. I've been focused on getting 24 bit audio, low latency, C16 support, and a control panel for selecting MEC modules.

I'm considering what to do after I get the ASIO done. Should the next step be major integration with Reaper via it's API? I don't believe for a minute that the secret to the PARIS sound is in the PARIS app because it's just a controller for the hardware. All the mixing, routing, effects, gain staging - everything - is done in the hardware.

But, I really like the PARIS app. So, developing something that works basically the same way appeals to me, even if it is a little crazy.

All the best!

Mike

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [DJ](#) on Sun, 14 Apr 2013 18:39:43 GMT

[View Forum Message](#) <> [Reply to Message](#)

mikeaudet wrote on Sun, 14 April 2013 11:04Hi DJ,

It's great to see you around here. The work I've done with Reaper so far has just been using it as an ASIO host. I haven't yet got EDS plugins working with it. I've been focused on getting 24 bit

audio, low latency, C16 support, and a control panel for selecting MEC modules.

I'm considering what to do after I get the ASIO done. Should the next step be major integration with Reaper via it's API? I don't believe for a minute that the secret to the PARIS sound is in the PARIS app because it's just a controller for the hardware. All the mixing, routing, effects, gain staging - everything - is done in the hardware.

But, I really like the PARIS app. So, developing something that works basically the same way appeals to me, even if it is a little crazy.

All the best!

Mike

Mike,

I'm also onboard with the idea that the headroom aspects and "Paris sound" is related to the ESP2 DSP chips. Being able to use the Paris DSP and GUI and set auxes to Pre/Post while running UAD plugins while tracking and mixing would be very cool. The only gotcha' (there's always a "gotcha") is that using the UA Apollo in standalone mode will not retain the plugin and settings. Now if there was some way to use the Apollo driver via ASIO while still having access to the Paris DSP so that the UAD plugins could be instantiated as VST with recallable settings, I'd probably buy another Paris system. UAD plugins are the only ones I use these days so for my personal needs, having these along with those wonderful Paris plugs that have been developed would make my life complete.

They are making mainboards nowadays with Thunderbolt interfaces that work with Windows systems. Damn I wish I could win the lotto. I'd see if I could talk to Edmund about farming the code out to you.....I'll buy a ticket next Wednesday.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!

Posted by [Aaron](#) on Sun, 14 Apr 2013 19:01:02 GMT

[View Forum Message](#) <> [Reply to Message](#)

Great work, I'm glad to see there is still amazing progress happening with you and P.A.R.I.S. Mike.

I don't know if you have started a notifications list of updated software/plug/driver/etc... items you have for sale but if one does exist I would love to be on it. I still have a working Paris rig (4 card, word clock, 3 MEC) but life has taken me down many roads and I don't spend much time on it these days. One of the kind members sent me notice about this thread from the 'old newsgroup'. Tip 'o the hat from one of the old guard PARIS guys.

I would definitely like to see news posted out to the (somewhat unofficial) facebook PARIS user community: <https://www.facebook.com/groups/344712405566469/>

Superb work Mr. Audet.

Subject: Re: PARIS ASIO/Scherzo64 Coming along very nicely!
Posted by [kerryg](#) on Sun, 28 Apr 2013 20:34:05 GMT
[View Forum Message](#) <> [Reply to Message](#)

Heads up folks - the driver is RELEASED! See sticky post here.
